INDEX TO AUTHORS

BAUER, JOHANNES H. See WEBSTER, CLOW, and BAUER, 479

BEERS, DANIEL N. See MORTON and BEERS, 59

BERNSTEIN, CLARENCE, JR. Studies on anaphylaxis with pollen, 149

BERRY, G. P. See RIVERS and BERRY, 205

BLOOMFIELD, ARTHUR L. The effect of various protein rations on the serum protein concentration of the rat, 465

BUTLER, ALLAN M. See KERPEL-FRONIUS and BUTLER, 157

CATRON, LLOYD. Studies on bacterial localization. Effects of specific immunization and of a gum acacia medium on localization of Type I pneumococci in mice, 735

CLAUDE, ALBERT. Properties of the causative agent of a chicken tumor. X. Chemical properties of chicken tumor extracts, 27

—. XI. Chemical composition of purified chicken tumor extracts containing the active principle, 41

CLOW, ANNA D. See WEBSTER, CLOW, and BAUER, 479

COGGESHALL, LOWELL T. Tests for pneumococcus hypersensitiveness in dogs after recovery from experimental pneumococcus lobar pneumonia, 235

COGGESHALL, LOWELL T., and ROBERTSON, O. H. A study of repeated attacks of experimental pneumococcus lobar pneumonia in dogs, 213

DURAN-REYNALS, F. The extent of local dispersion of infectious agents as a factor in resistance to infection, 617

FITE, GEORGE L. See WEBSTER and FITE, 103, 411

FORKNER, CLAUDE E., and ZIA, LILY S. Further studies on kala-azar. Leishmania in nasal and oral secretions of patients and the bearing of this finding on the transmission of the disease, 183

FURTH, J. Transmission of myeloid leucemia of mice. Its relation to myeloma, 423

—. See STUBBS and FURTH, 593

GOETTSCH, E. See WEECH, GOETTSCH, and REEVES, 299, 717

GREENE, HARRY S. N. Rabbit pox. III. Report of an epidemic with especial reference to epidemiological factors, 807

HARE, RONALD. See LANCEFIELD and HARE, 335

HARROP, GEORGE A., SOFFER, LOUIS J., NICHOLSON, WILLIAM M., and STRAUSS, MARGARET. Studies on the suprarenal cortex. IV. The

effect of sodium salts in sustaining the suprarenalectomized dog, 839

HAWKINS, W. B. See KNUTTI and HAWKINS, 115

—. See KNUTTI, HAWKINS, and WHIPPLE, 127

HEIDELBERGER, MICHAEL, and KENDALL, FORREST E. The precipitin reaction between Type III pneumococcus polysaccharide and homologous antibody. II. Conditions for quantitative precipitation of antibody in horse sera, 559

— and —. III. A quantitative study and a theory of the reaction mechanism, 563

HUDACK, STEPHEN S. See MCMASTER and HUDACK, 783

—. See ROUS, MCMASTER, and HUDACK, 657

JACOBS, JOHN. See LANDSTEINER and JACOBS, 643

KARIHER, D. H. See POMMERENKE, SLAVIN, KARIHER, and WHIPPLE, 261, 283

KENDALL, FORREST E. See HEIDELBERGER and KENDALL, 559, 563

KERPEL-FRONIUS, EDMOND, and BUTLER, ALLAN M. Salt and water losses in diuretin diuresis and their relation to serum non-protein nitrogen and electrolyte concentrations, 157

KNUTTI, R. E., and HAWKINS, W. B. I. Bartonella incidence in splenectomized bile fistula dogs, 115

—, —, and WHIPPLE, G. H. II. Hemoglobin and bile pigment overproduction in the splenectomized bile fistula dog, 127

LANCEFIELD, REBECCA C., and HARE, RONALD. The serological differentiation of pathogenic and non-pathogenic strains of hemolytic streptococci from parturient women, 335

LANDSTEINER, K., and JACOBS, JOHN. Studies on the sensitization of animals with simple chemical compounds, 643

LYONS, CHAMP, and WARD, HUGH K. Studies on the hemolytic streptococcus of human origin. II. Observations on the protective mechanism against the virulent variants, 531

—. See WARD and LYONS, 515

MACKAY, EATON M., and OLIVER, JEAN. Renal damage following the ingestion of a diet containing an excess of inorganic phosphate, 319

MCMASTER, PHILIP D., and HUDACK, STEPHEN S. The formation of agglutinins within lymph nodes, 783

—. See ROUS, MCMASTER, and HUDACK, 657

MILLER, D. K., and RHOADS, C. P. The experimental production in dogs of acute stomatitis, associated with leucopenia and a maturation defect of the myeloid elements of the bone marrow, 173

—. See RHOADS and MILLER, 139

MOEN, JOHANNES K. The development of pure cultures of fibroblasts from single mononuclear cells, 247

MORTON, JOHN J., and BEERS, DANIEL N. The demonstration of a tumor growth-inhibiting factor from normal human connective tissue, 59

NELSON, JOHN B. Studies on an uncomplicated coryza of the domestic fowl. III. The effect of extranasal injection on the growth of the fowl coryza bacillus, 351

—. IV. Susceptibility after extranasal injection of the fowl coryza bacillus, 361

NETER, ERWIN. See WITEBSKY and NETER, 489

—. See WITEBSKY, NETER, and SOBOTKA, 703

NICHOLSON, WILLIAM M. See HARROP, SOFFER, NICHOLSON, and STRAUSS, 839

NIGG, CLARA. On the preservation of typhus fever rickettsiae in cultures, 17

OLIVER, JEAN. See MACKAY and OLIVER, 319

PAGE, IRVINE H. Observations on the depressor extracts of human blood and on the vascular action of extracts of rabbit and dog blood, 97

—. Pressor substances from the body fluids of man in health and disease, 67

PAUL, JOHN R., and TRASK, JAMES D. The neutralization test in poliomyelitis. Comparative results with four strains of the virus, 447

POMMERENKE, W. T., SLAVIN, H. B., KARIHER, D. H., and WHIPPLE, G. H. Blood plasma protein regeneration controlled by diet. Systematic standardization of food proteins for potency in protein regeneration. Fasting and iron feeding, 261

—, —, —, and —. Dog plasma protein given by vein utilized in body metabolism of dog. Horse plasma and dog hemoglobin not similarly utilized, 283

RAKE, GEOFFREY. Studies on meningococcus infection. VII. The study of an isolated epidemic, 545

—. See SCHERP and RAKE, 753

REEVES, E. B. See WEECH, GOETTSCH, and REEVES, 299, 717

RHOADS, C. P., and MILLER, D. K. The association of bartonella bodies with induced anemia in the dog, 139

—. See MILLER and RHOADS, 173

RIVERS, THOMAS M., and BERRY, G. P. Diagnosis of psittacosis in man by means of injections of sputum into white mice, 205

— and SCHWENTKER, FRANCIS F. Encephalomyelitis accompanied by myelin destruction experimentally produced in monkeys, 689

ROBERTSON, O. H. See COGGESHALL and ROBERTSON, 213

ROUS, PEYTON, MCMASTER, PHILIP D., and HUDACK, STEPHEN S. The fixation and protection of viruses by the cells of susceptible animals, 657

SABIN, FLORENCE R. See SMITHBURN and SABIN, 771

SCHERP, HENRY W., and RAKE, GEOFFREY. Studies on meningococcus infection. VIII. The Type I specific substance, 753

SCHWENTKER, FRANCIS F. See RIVERS and SCHWENTKER, 689

SHWARTZMAN, GREGORY. Grading of local skin reactivity to bacterial filtrates, 383

—. Phenomenon of local skin reactivity to *Bacillus tuberculosis*. I. Skin-preparatory and reacting potencies of tuberculin, O.T., and *Bacillus tuberculosis* culture filtrates, 369

SLAVIN, H. B. See POMMERENKE, SLAVIN, KARIHER, and WHIPPLE, 261, 283

SMITHBURN, KENNETH C. The colony morphology of tubercle bacilli. I. The presence of smooth colonies in strains recently isolated from sources other than sputum, 395

— and SABIN, FLORENCE R. The cellular reactions to acetone-soluble fat from mycobacteria and streptococci. The effect of neutralization on the biological activity of the tuberculo-lipoid and of the phthioic acid derived from it, 771

SOBOTKA, HARRY. See WITEBSKY, NETER, and SOBOTKA, 703

SOFFER, LOUIS J. See HARROP, SOFFER, NICHOLSON, and STRAUSS, 839

STRAUSS, MARGARET. See HARROP, SOFFER, NICHOLSON, and STRAUSS, 839

STUBBS, E. L., and FURTH, J. The relation of leucosis to sarcoma of chickens. I. Sarcoma and erythroleucosis (Strain 13), 593

TRAGER, WILLIAM. Cultivation of the virus of grasserie in silkworm tissue cultures, 501

TRASK, JAMES D. See PAUL and TRASK, 447

TRAUB, ERICH. Multiplication *in vitro* of pseudorabies virus in the testicle tissue of immunized guinea pigs, 833

VONGLAHN, WILLIAM C., and WELD, JULIA T. The effect of *Staphylococcus aureus* toxin on the kidney, 1

WARD, HUGH K., and LYONS, CHAMP. Studies on the hemolytic streptococcus of human origin. I. Observations on the virulent, attenuated, and avirulent variants, 515

—. See LYONS and WARD, 531

WEBSTER, LESLIE T., CLOW, ANNA D., and BAUER, JOHANNES H. Experimental studies on encephalitis. III. Survival of encephalitis virus (St. Louis type) in *Anopheles quadrimaculatus*, 479

— and FITE, GEORGE L. Experimental studies on encephalitis. I. Transmission of St. Louis and Kansas City encephalitis to mice, 103

— and —. II. The specific virus character of the infectious agent from cases of St. Louis and Kansas City encephalitis, 1933, 411

WEECH, A. A., GOETTSCH, E., and REEVES, E. B. Nutritional edema in the dog. I. Development of hypoproteinemia on a diet deficient in protein, 299

—, —, and —. II. Hypoalbuminemia and the augmentation of tissue fluid, 717

WELD, JULIA T. Further studies with toxic serum extracts of hemolytic streptococci, 473

—. See VONGLAHN and WELD, 1

WHIPPLE, G. H. See KNUTTI, HAWKINS, and WHIPPLE, 127

—. See POMMERENKE, SLAVIN, KARIHER, and WHIPPLE, 261, 283

WITEBSKY, ERNST, and NETER, ERWIN. Primary serum toxicity as demonstrated by the chicken embryo, 489

—, —, and SOBOTKA, HARRY. The relation between the type specific carbohydrates of pneumococci and the blood group specific substance A, 703

WOLFRAM, J., and ZWEMER, R. L. Cortin protection against anaphylactic shock in guinea pigs, 9

ZIA, LILY S. See FORKNER and ZIA, 183

ZWEMER, R. L. See WOLFRAM and ZWEMER, 9

INDEX TO SUBJECTS

ACACIA medium, effects on localization of Type I pneumococci, 735
Acetone-soluble fat from mycobacteria, cellular reactions, 771
— — — streptococci, cellular reactions, 771
Agglutinins, formation in lymph nodes, 783
Albuminemia, hypo-, in nutritional edema, 717
Anaphylactic shock, cortin protection against, 9
Anaphylaxis with pollen, 149
Anemia, induced, association of bartonella bodies, 139
Anopheles quadrimaculatus, survival of encephalitis virus, St. Louis type, in, 479
Antibody, homologous, and Type III pneumococcus polysaccharide, precipitin reaction between, 559, 563
— in horse sera, conditions for quantitative precipitation, 559

BACILLUS, fowl coryza, growth, effect of extranasal injection, 351
—, — —, susceptibility of domestic fowl after extranasal injection, 361
— *tuberculosis*, colony morphology, 395
— —, culture filtrates, skin-preparatory and reacting potencies, 369
— —, local skin reactivity, 369
Bacterial filtrates, local skin reactivity, 383
— localization, 735
Bartonella bodies, association with induced anemia, 139
— incidence in splenectomized bile fistula dogs, 115
Bile fistula combined with splenectomy, bartonella incidence, 115
— — — — splenectomy, bile pigment overproduction, 127
— — — — splenectomy, hemoglobin overproduction, 127
— pigment overproduction resulting from splenectomy in bile fistula dog, 127
Biology, activity of tuberculo-lipoid, effect of neutralization, 771
Blood, dog, extracts, vascular action, 97
— group specific substance A, and type specific carbohydrates of pneumococci, relation, 703
—, human, depressor extracts, 97
— plasma. *See* Plasma.
—, rabbit, extracts, vascular action, 97
— vessel, extracts of dog blood, action, 97
— —, — — rabbit blood, action, 97
Bone marrow, myeloid elements, maturation defect, associated with acute stomatitis, 173

CARBOHYDRATES of pneumococci, type specific, and blood group specific substance A, relation, 703
Cells, single mononuclear, pure cultures of fibroblasts from, 247
—, susceptible animals, fixation and protection of viruses by, 657

Cellular reactions to acetone-soluble fat from mycobacteria, 771
— — — acetone-soluble fat from streptococci, 771
Chemical composition of purified chicken tumor extracts containing active principle, 41
— compounds, simple, sensitization of animals, 643
— properties of chicken tumor extracts, 27
Connective tissue. *See* Tissue.
Cortex, suprarenal, 839
Cortin protection against anaphylactic shock, 9
Coryza bacillus, fowl, growth, effect of extranasal injection, 351
— —, —, susceptibility of domestic fowl after extranasal injection, 361
—, uncomplicated, of domestic fowl, 351, 361
Cultivation, *Bacillus tuberculosis* filtrates, skin-preparatory and reacting potencies, 369
—, pure, fibroblasts from single mononuclear cells, 247
—, silkworm tissue, grasserie virus in, 501
—, typhus fever rickettsiae, preservation, 17
—, virus, grasserie, in silkworm tissue cultures, 501

DEPRESSOR extracts of human blood, 97
Diet containing excess of inorganic phosphate, renal damage after ingestion, 319
— controlling blood plasma protein regeneration, 261
— deficient in protein, development of hypoproteinemia, 299
Diuresis, diuretin, salt losses, relation to serum electrolyte concentration, 157
Diuresis, diuretin, salt losses, relation to serum non-protein nitrogen concentration, 157
—, —, water loss, relation to serum electrolyte concentration, 157
—, —, — —, relation to serum non-protein nitrogen concentration, 157
Diuretin diuresis, salt losses, relation to serum electrolyte concentration, 157
— —, — —, relation to serum non-protein nitrogen concentration, 157
— —, water loss, relation to serum electrolyte concentration, 157
— —, — —, relation to serum non-protein nitrogen concentration, 157

EDEMA, nutritional, 299, 717
Electrolyte, serum, concentration, relation of salt losses in diuretin diuresis, 157
—, —, —, relation of water loss in diuretin diuresis, 157
Embryo, chicken, demonstrating primary serum toxicity, 489
Encephalitis, 103, 411, 479
—, Kansas City, 1933, specific virus character of infectious agent, 411
—, — —, transmission to mice, 103
—, St. Louis, 1933, specific virus character of infectious agent, 411
—, — —, transmission to mice, 103
— virus, St. Louis type, survival in *Anopheles quadrimaculatus*, 479
Encephalomyelitis with myelin destruction in monkeys, 689
Epidemic, isolated, meningococcus infection, 545
— rabbit pox, with reference to epidemiological factors, 807

Erythroleucosis, Strain 13, and sarcoma, 593
Extracts, chicken tumor, chemical properties, 27
—, — —, purified, containing active principle, chemical composition, 41
—, depressor, of human blood, 97
—, dog blood, vascular action, 97
—, rabbit blood, vascular action, 97
—, toxic serum, of hemolytic streptococci, 473

FASTING in systematic standardization of food proteins for potency in protein regeneration, 261
Fat, acetone-soluble, from mycobacteria, cellular reactions, 771
—, —, — streptococci, cellular reactions, 771
Fever, typhus. *See* Typhus.
Fibroblasts from single mononuclear cells, pure cultures, 247
Filtrates, *Bacillus tuberculosis* culture, skin-preparatory and reacting potencies, 369
—, bacterial, local skin reactivity, 383
Fistula, bile, combined with splenectomy, bartonella incidence, 115
—, —, — — splenectomy, bile pigment overproduction, 127
—, —, — — splenectomy, hemoglobin overproduction, 127
Fluid, tissue, augmentation in nutritional edema in dog, 717
Fluids, human body, pressor substances in health and disease, 67
Food proteins, systematic standardization for potency in protein regeneration, 261
Fowl coryza bacillus, growth, effect of extranasal injection, 351
Fowl coryza bacillus, susceptibility of domestic fowl after extranasal injection, 361
—, domestic, uncomplicated coryza, 351, 361
— sarcoma and leucosis, relation, 593
— tumor extracts, chemical properties, 27
— — —, purified, containing active principle, chemical composition, 41
— —, properties of causative agent, 27, 41

GRASSERIE virus, cultivation in silkworm tissue cultures, 501
Growth-inhibiting factor against tumor, from normal human connective tissue, 59
Gum acacia. *See* Acacia.

HEMOGLOBIN, dog, not utilized in body metabolism of dog, 283
— overproduction resulting from splenectomy in bile fistula dog, 127
Hemolytic streptococci from parturient women, pathogenic and nonpathogenic strains, serological differentiation, 335
— —, toxic serum extracts, 473
— streptococcus, human origin, attenuated variant, 515
— —, — —, avirulent variant, 515
— —, — —, protective mechanism against virulent variants, 531
— —, — —, virulent variants, 515
Homologous antibody and Type III pneumococcus polysaccharide, precipitin reaction between, 559, 563
Horse sera, antibody in, conditions for quantitative precipitation, 559

Hypersensitiveness, pneumococcus, in dogs, after recovery from pneumococcus lobar pneumonia, tests, 235
Hypoalbuminemia in nutritional edema in dog, 717
Hypoproteinemia, development on diet deficient in protein, 299

IMMUNIZATION, *in vitro* multiplication of pseudorabies virus in testicle tissue of guinea pigs after, 833
—, specific, effects on localization of Type I pneumococci, 735
In vitro multiplication of pseudorabies virus in testicle tissue of immunized guinea pigs, 833
Iron feeding in systematic standardization of food proteins for potency in protein regeneration, 261

KALA-AZAR. *See* Leishmaniasis.

Kansas City encephalitis, 1933, specific virus character of infectious agent, 411
— — —, transmission to mice, 103
Kidney damage after ingestion of diet containing excess of inorganic phosphate, 319
—, effect of *Staphylococcus aureus* toxin, 1

LEISHMANIA in nasal and oral secretions of patients with kala-azar, bearing on transmission, 183
Leishmaniasis, leishmania in nasal and oral secretions, bearing on transmission, 183
Leucemia, myeloid, of mice, transmission, relation to myeloma, 423
Leucopenia associated with acute stomatitis, 173
Leucosis and chicken sarcoma, relation, 593
Lipoid, tuberculo-, biological activity, effect of neutralization, 771
Lymph nodes, formation of agglutinins in, 783

MARROW. *See* Bone marrow.

Meningococcus infection, 545, 753
— —, isolated epidemic, 545
— —, Type I specific substance, 753
Metabolism, body, dog, plasma protein of dog given by vein utilized in, 283
Mononuclear cells, single, pure cultures of fibroblasts from, 247
Morphology, colony, of tubercle bacillus, 395
Mouth and nose, secretions of patients with kala-azar, bearing of finding of leishmania on transmission of disease, 183
Mycobacteria, acetone-soluble fat, cellular reactions, 771
Myelin destruction and encephalomyelitis in monkeys, 689
Myeloid elements of bone marrow, maturation defect, associated with acute stomatitis, 173
— leucemia of mice, transmission, relation to myeloma, 423
Myeloma, relation to myeloid leucemia of mice, 423

NASAL and oral secretions of patients with kala-azar, bearing of finding of leishmania on transmission of disease, 183
Nitrogen, non-protein, concentration in serum, relation of salt losses in diuretin diuresis, 157
—, —, — in serum, relation of water loss in diuretin diuresis, 157
Node, lymph. *See* Lymph.
Nutritional edema, 299, 717

PARTURIENT women, pathogenic and non-pathogenic strains of hemolytic streptococci, serological differentiation, 335
Pathogenic and non-pathogenic strains of hemolytic streptococci from parturient women, serological differentiation, 335
Phosphate, inorganic, renal damage after ingestion of diet containing excess, 319
Phthioic acid derived from tuberculolipoid, effect of neutralization on biological activity, 783
Pigment, bile, overproduction, resulting from splenectomy in bile fistula dog, 127
Plasma, horse, not utilized in body metabolism of dog, 283
— protein, dog, given by vein, utilized in body metabolism of dog, 283
— —, regeneration controlled by diet, 261
Pneumococci, Type I, localization, effects of gum acacia medium, 735
—, — —, —, effects of specific immunization, 735
—, type specific carbohydrates, and blood group specific substance A, relation, 703
Pneumococcus hypersensitiveness in dogs after recovery from pneumococcus lobar pneumonia, tests, 235
— lobar pneumonia in dogs, repeated attacks, 213
— — —, tests for pneumococcus hypersensitiveness in dogs after recovery from, 235
— Type III polysaccharide and homologous antibody, precipitin reaction between, 559, 563
Pneumonia, lobar, pneumococcus, repeated attacks in dogs, 213
—, —, —, tests for pneumococcus hypersensitiveness in dogs after recovery from, 235
Poliomyelitis, neutralization test, comparative results with four strains of virus, 447
Pollen, anaphylaxis with, 149
Polysaccharide, Pneumococcus Type III, and homologous antibody, precipitin reaction between, 559, 563
Precipitin reaction between Type III pneumococcus polysaccharide and homologous antibody, 559, 563
Pressor substances from human body fluids in health and disease, 67
Protein, blood plasma, regeneration controlled by diet, 261
— concentration, serum, effect of various protein rations, 465
—, diet deficient in development of hypoproteinemia, 299
—, non-, nitrogen, serum concentration, relation of salt losses in diuretin diuresis, 157
—, —, —, — concentration, relation of water loss in diuretin diuresis, 157
—, plasma, dog, given by vein, utilized in body metabolism of dog, 283
— rations, effect on serum protein concentration, 465
— regeneration, systematic standardization of food proteins for potency in, 261
Proteinemia, hypo-, development on diet deficient in protein, 299
Proteins, food, systematic standardization for potency in protein regeneration, 261
Pseudorabies virus, *in vitro* multiplication in testicle tissue of immunized guinea pigs, 833
Psittacosis in man, diagnosis by injections of sputum into white mice, 205

RABBIT pox, 807
— —, epidemic, with reference to epidemiological factors, 807

Reaction, precipitin, between Type III pneumococcus polysaccharide and homologous antibody, 559, 563
Renal. *See* Kidney.
Resistance to infection, extent of local dispersion of infectious agents as factor, 617
Rickettsiae, typhus fever, preservation in cultures, 17

ST. LOUIS encephalitis, 1933, specific virus character of infectious agent, 411
— — —, transmission to mice, 103
— — type encephalitis virus, survival in *Anopheles quadrimaculatus*, 479
Salt losses in diuretin diuresis, relation to serum electrolyte concentration, 157
— — — diuretin diuresis, relation to serum non-protein nitrogen concentration, 157
Salts, sodium, effect in sustaining animal after suprarenalectomy, 839
Sarcoma, chicken, and leucosis, relation, 593
— and erythroleucosis Strain 13, 593
Sensitization of animals with simple chemical compounds, 643
Sera, horse, antibody in, conditions for quantitative precipitation, 559
Serological differentiation of pathogenic and non-pathogenic strains of hemolytic streptococci from parturient women, 335
Serum electrolyte concentration, relation of salt losses in diuretin diuresis, 157
— — —, relation of water loss in diuretin diuresis, 157
— extracts, toxic, of hemolytic streptococci, 473
Serum non-protein nitrogen concentration, relation of salt losses in diuretin diuresis, 157
— — — —, relation of water loss in diuretin diuresis, 157
— protein concentration, effect of various protein rations, 465
— toxicity, primary, demonstrated by chicken embryo, 489
Shock, anaphylactic, cortin protection against, 9
Silkworm tissue cultures, cultivation of grasserie virus in, 501
Skin reactivity, local, to *Bacillus tuberculosis*, 369
— —, —, to bacterial filtrates, 383
Skin-preparatory and reacting potencies of *Bacillus tuberculosis* culture filtrates, 369
— — — — of tuberculin, O.T., 369
Sodium salts, effect in sustaining animal after suprarenalectomy, 839
Specific immunization, effects on localization of Type I pneumococci, 735
— substance, blood group A, and type specific carbohydrates of pneumococci, relation, 703
— —, Type I, meningococcus infection, 753
—, type, carbohydrates of pneumococci, and blood group specific substance A, relation, 703
— virus character of infectious agent from cases of Kansas City encephalitis, 1933, 411
— — — of infectious agent from cases of St. Louis encephalitis, 1933, 411
Splenectomy combined with bile fistula, bartonella incidence, 115
— — — bile fistula, bile pigment overproduction, 127
— — — bile fistula, hemoglobin overproduction, 127

Sputum injected into white mice, means of diagnosis of psittacosis in man, 205
—, presence of smooth colonies of tubercle bacilli in strains recently isolated from sources other than, 395
Staphylococcus aureus toxin, effect on kidney, 1
Stomatitis, acute, associated with leucopenia and maturation defect of myeloid elements of bone marrow, 173
Streptococci, acetone-soluble fat, cellular reactions, 771
—, hemolytic, from parturient women, pathogenic and non-pathogenic strains, serological differentiation, 335
—, —, toxic serum extracts, 473
Streptococcus, hemolytic, human origin, attenuated variant, 515
—, —, — —, avirulent variant, 515
—, —, — —, protective mechanism against virulent variants, 531
—, —, — —, virulent variants, 515
Suprarenal cortex, 839
Suprarenalectomy, effect of sodium salts in sustaining animal after, 839
Susceptible animals, fixation and protection of viruses by cells, 657
Susceptibility of domestic fowl after extranasal injection of fowl coryza bacillus, 361

TESTICLE tissue of immunized guinea pigs, *in vitro* multiplication of pseudorabies virus, 833
Tissue, connective, normal human, tumor growth-inhibiting factor from, 59
— cultures, silkworm, cultivation of grasserie virus in, 501
— fluid, augmentation in nutritional edema, 717
Tissue, testicle, of immunized guinea pigs, *in vitro* multiplication of pseudorabies virus, 833
Toxic serum extracts of hemolytic streptococci, 473
Toxicity, serum, primary, demonstrated by chicken embryo, 489
Toxin, *Staphylococcus aureus*, effect on kidney, 1
Transmission, kala-azar, leishmania in nasal and oral secretions, bearing on, 183
—, Kansas City encephalitis, to mice, 103
—, myeloid leucemia of mice, 423
—, St. Louis encephalitis, to mice, 103
Tuberculin, O. T., skin-preparatory and reacting potencies, 369
Tuberculo-lipoid, biological activity, effect of neutralization, 771
Tuberculosis bacillus, colony morphology, 395
Tumor, chicken, extracts, chemical properties, 27
—, —, —, purified, containing active principle, chemical composition, 41
—, —, properties of causative agent, 27, 41
— growth-inhibiting factor from normal human connective tissue, 59
Typhus rickettsiae, preservation in cultures, 17

VIRULENCE, hemolytic streptococci of human origin, protective mechanism against virulent variants, 515
—, — — of human origin, virulent, attenuated, and avirulent variants, 515
Virus character, specific, of infectious agent from cases of Kansas City encephalitis, 1933, 411

Virus character, specific, of infectious agent from cases of St. Louis encephalitis, 1933, 411
—, encephalitis, St. Louis type, survival in *Anopheles quadrimaculatus*, 479
—, grasserie, cultivation in silkworm tissue cultures, 501
—, poliomyelitis, four strains, comparative results in neutralization test, 447
Virus, pseudorabies, *in vitro* multiplication in testicle tissue of immunized guinea pigs, 833
Viruses, fixation and protection by cells of susceptible animals, 657

WATER loss in diuretin diuresis, relation to serum electrolyte concentration, 157
— — — diuretin diuresis, relation to serum non-protein nitrogen concentration, 157